

PATENT

Atty Docket No.: 10010944-2

App. Ser. No.: 10/696,837

IN THE CLAIMS:

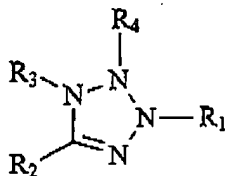
Please find a listing of the claims below, with the statuses of the claims shown in parentheses. This listing will replace all prior versions, and listings, of claims in the present application.

Claims 1 - 7 (Canceled)

8. [Original] A molecular system configured between a pair of electrodes, said molecular system including at least one organic non-polymeric molecule that changes color when oxidized or reduced by an electric current.

9. [Original] The molecular system of Claim 8 wherein said organic non-polymeric molecule comprises a substituted tetrazole.

10. [Original] The molecular system of Claim 9 wherein said substituted tetrazole is represented by the formula



where R₁, R₂, R₃, and R₄ are independently H, alkyls, or aryls and the ring carbon is in the 3-position.

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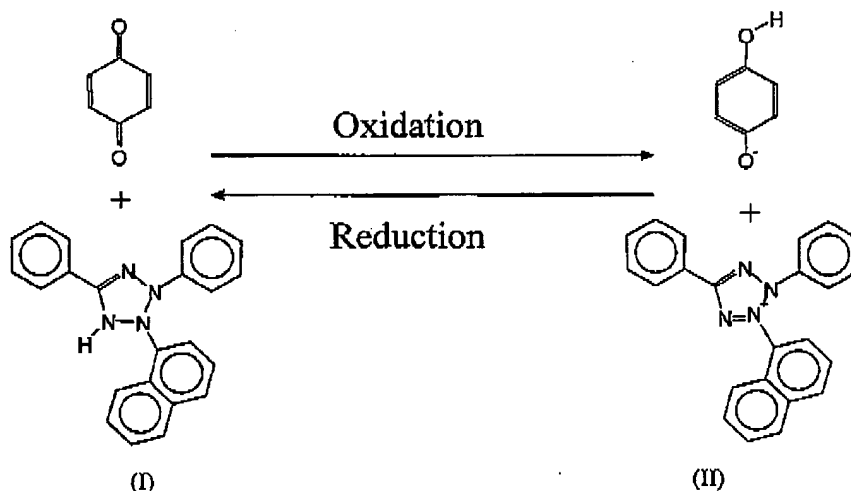
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11. [Original] The molecular system of Claim 10 wherein any two of R_1 , R_2 , R_3 , and R_4 are alkyls and/or aryls, and the remainder hydrogen.

12. [Original] The molecular system of Claim 10 wherein the ring carbon is in the 2-position.

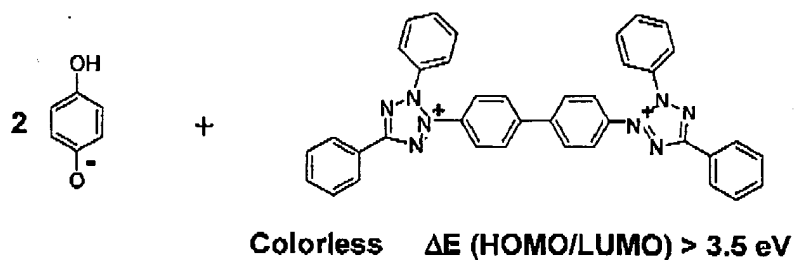
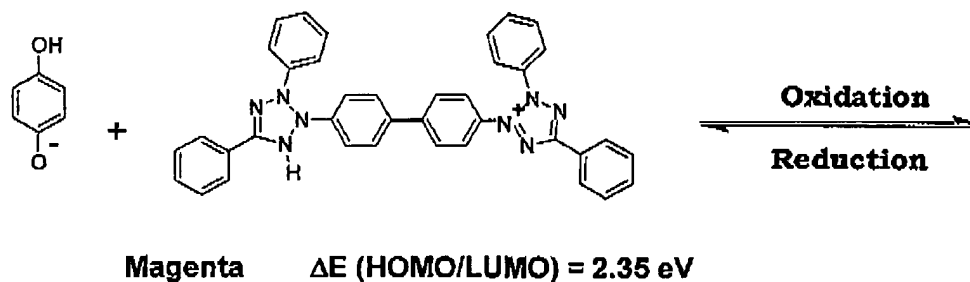
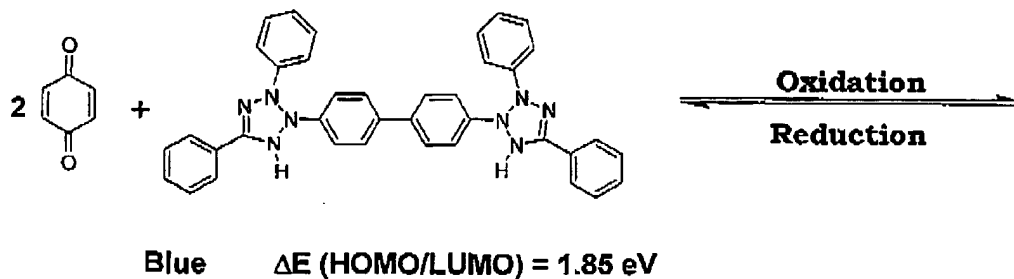
13. [Original] The molecular system of Claim 10 wherein said molecular system comprises:



wherein (I) is purple and has a $\Delta E_{\text{HOMO/LUMO}} = 2$ eV and wherein (II) is colorless and has a $\Delta E_{\text{HOMO/LUMO}} > 3.5$ eV.

14. [Original] The molecular system of Claim 10 wherein said molecular system comprises:

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wherein (III) is blue and as a $\Delta E_{\text{HOMO/LUMO}} = 1.85$ eV, wherein (IV) is magenta and has a $\Delta E_{\text{HOMO/LUMO}} = 2.35$ eV, and wherein (V) is colorless and has a $\Delta E_{\text{HOMO/LUMO}} > 3.5$ eV.